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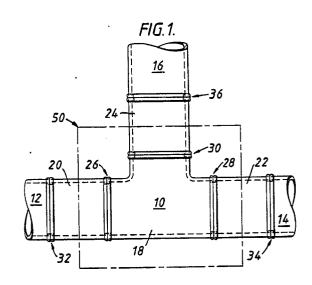
Date of deferred publication of the search report: 20.06.90 Bulletin 90/25 71) Applicant: British Gas plc Rivermill House, 152 Grosvenor Road London SW1V 3JL(GB)

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## 54 Structures of plastics material.

(57) Large fittings or other structures are made by rotationally moulding a first component 18 of polyethylene and joining cylindrical pups 20, 22, 24 of polyethylene to the component by butt fusion joints 26, 28, 30. The structure within the boundary 50 is irradiated with gamma radiation followed by postheating to remove free radicals. The extremities of the pups are shielded to prevent irradiation. Their capability to be joined to polyethylene pipes 12, 14, 16 by butt-fusion joints 32, 34, 36 is unimpaired. The irradiation introduces cross-linking to give improved mproperties such as impact resistance and stress specification for polyethylene pipe for natural gas distribution. The joints 26, 28, 30 are made using differential heating of the ends to be joined to compensate for differences in melt flow index. Alternatively, the component 18 is slightly irradiated to Nower its MFI before pups are joined to it.



## EUROPEAN SEARCH REPORT

EP 87 30 7064

T	DOCUMENTS CONSII  Citation of document with in	dication, where annropriate.	Relevant	CLASSIFICATION OF THE
ategory	of relevant pas	sages	to claim	APPLICATION (Int. Cl.4)
E	EP-A-0 246 030 (VIC * Column 3, lines 22	CTAULIC) 2-37; claims 5-7 *	1-14	B 29 C 71/04 B 29 C 65/02
Х	JS-A-4 056 421 (JARVIS) * Abstract *		1	B 29 D 23/22 // B 29 L 31/24
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A	DD-A-0 152 236 (A.I * Example 3 *	D.W.)	1	
A	US-A-4 401 536 (LUI * columns 3,10-15 *	NDELL)	3	
A	DE-B-1 130 153 (NE * Column 3, lines 9		3	
A	FR-A-2 196 888 (PONT-A-MOUSSON) * Claim 1 *			TECHNICAL FIELDS
A	FR-A-2 393 664 (HEPWORTH IRON) * Claims; fig. *			SEARCHED (Int. Cl.4)  B 29 C
A FR-A-2 463 787 ( * Fig.; claims *		RL FREUDENBERG)		
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	The present search report has t	een drawn up for all claims		
Time of Senior		Date of completion of the sea 20-03-1990	l l	Examiner RDENIER J.
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Y : pa	CATEGORY OF CITED DOCUME articularly relevant if taken alone articularly relevant if combined with an accument of the same category chnological background	E : earlier pa after the oother D : document L : document	principle underlying them document, but pu filing date I cited in the applicati- cited for other reason of the same patent fam	on S